

REMARKS

New Computer program Claims 24-31 Satisfy 35 USC 101  
Requirements

In order to rewrite the computer program claims so as to put these claims in better form to satisfy 35 USC 101, computer program claims 15-20 and 23 have been cancelled and respectively rewritten as new claims 24-29 and 31. New claim 30 corresponds to method claim 7. It is submitted that these new claims now satisfy Examiner's objection which led to the 35 USC 101 rejection. The claims now define the medium as "a computer useable medium having a computer readable program stored therein".

This description setting forth that the program is stored in the medium describes a program tangibly embodied in the medium as suggested by Examiner. Accordingly, it is respectfully requested that the rejection of the computer program claims under 35 U.S.C. 101 be withdrawn.

The rejection of claims 1-6, 8-13, and corresponding new computer program claims 24-29 under 35 U.S.C. 103(a) over the combination of Excel (Jinjer Simon 'Excel in a Nutshell' O'Reilly, 2001) in view of Havre, further in view of Hao is respectfully traversed.

The present invention relates to a user interactive displayed line graph in which the proportion of the total value of the same time dependent variable contributed by each of a set of elements is displayed as an area in an ordered set of areas under a line representing the total value of the time dependent variable. The user is enabled to interactively select one of these areas, and to perform one of the following operations:

- hiding the selected area,
- displaying the selected area

- reordering the position of the selected area within said ordered set responsive to said user selection.

The Excel Publication:

The Examiner has cited this Publication for showing the basic user interactive displayed line graph in which the proportion of the total value of the same time dependent variable contributed by each of a set of elements is displayed as an area in an ordered set of areas under a line representing the total value of the time dependent variable.

Thus far, Applicant can not find this disclosure in the copy of the cited section with Figure 10-6 of Excel. The article was sent to Applicant accompanying the Official Action. When Applicant notified Examiner that the copy was not clear and readable, the Examiner resent the article by facsimile. The elements which Examiner feels correspond to the above described stacked graph are not clearly shown in the copies. A stacked line graph is shown but it is not clear that the stacked areas all relate to the same time dependent variable. Applicant notes that on the page in Excel preceding Fig. 10-6, it is stated that the purpose is to explore: "...the relationship between two different numerical variables and compare trends across uneven time periods."

Since the present prosecution has already involved four non-final official actions, and a final official action in response to which Applicant had to submit an appeal brief before the action was withdrawn, Applicants will for the purpose of this argument accept Examiner's interpretation that Fig. 10-6 of Excel does show a stack of areas representing portions of the same time dependent variable. However, Applicant is in the process of trying to get an original of the out-of print Excel text, and hopes that he

will be given an opportunity to modify the argument if Applicant then believes that the publication does not support Examiner's interpretation.

Accordingly, even if Examiner's application of Excel is appropriate, this basic reference still fails to disclose the claimed elements: enabling the user to interactively select one of these areas, and to perform one of the following operations:

- hiding the selected area,
- displaying the selected area
- reordering the position of the selected area within said ordered set responsive to said user selection.

For a teaching of these deficiencies in the basic Excel, Examiner looks to the Havre and Hao references. At this point, the Havre appears to contribute little to the prior art disclosure of the present invention beyond what has been, for the present arguendo conceded as the teaching of Excel. At most, Examiner's arguments seem to point to Havre's capability of visualization of more complex relationships, and to add historical prospective to basic Excel teaching. Applicant fails to see the further contribution of this to the issue of obviousness of the present invention. Thus, even combining Excel with Havre with all Examiner argues the combination teaches, there is still no teaching of: enabling the user to interactively select one of these areas, and to perform one of the following operations: hiding the selected area, displaying the selected area, or reordering the position of the selected area within said ordered set responsive to said user selection. For this teaching, the examiner must look to the Hao publication.

The modifying Hao reference does not make up for the deficiencies of Excel and Havre. Examiner specifically cites paragraphs 35, 36, and 40 in Hao to teach the concept of a display of a group of elements of the same time-dependent variable stacked under a line representing the total value of the same time dependent variable. Firstly, the variables described in these sections are not time dependent. What appears to be described in Hao are various data elements respectively shown or visualized as defined area segments in a user interactive graph. The user may select a sub-area on the graph which in effect will "rubber band" the selected area from its position on the graph. (By rubber banding, Applicant assumes, Hao intends that the area section is pulled out of the graph and displayed in such a way as to be returnable to its original position in the graph when no longer needed). In response to this pulling out, the process of Hao displays aggregated information from the data visualized by the sub-area, e.g., number of data records or the average response time for a sales transaction. Apparently, upon completion of the use of the displayed aggregated information, the selected section will snap back into its position on the graph.

In summary, for the reasons set forth above, even if Excel, Havre and Hao were combined as suggested by Examiner, the combination would still not suggest enabling the user to interactively select one of these areas, and to perform one of the following operations: hiding the selected area, displaying the selected area, or reordering the position of the selected area within said ordered set responsive to said user selection. While Hao does manipulate graphic elements, there is no suggestion of reordering of the position of the selected area since the area appears to be rubber-banded back to its original position. There is no also no teaching

in Hao of selectively hiding and/or then displaying of a selected area under a curve.

Accordingly, Applicant submits that the combination of Excel in view of Havre further in view of Hao fails to render claims 1-6, 8-13, and corresponding new computer program claims 24-29 obvious under 35 U.S.C. 103(a).

The Rejection of claims 21, 22, and 31 over the combination of Excel, in view of Havre, further in view of Rao et al. (6,085,202), still further in view of Yonts (6,590,577) under 35 U.S.C. 103(a) is respectfully traversed.

Claims 21, 22, and 31 are submitted to be patentable over the combination of Excel in view of Havre for all of the reasons set forth hereinabove for the patentability of claims 1, 8 and 24 from which these claims respectfully depend. In addition, claims 21, 22, and 31 set forth that the selected operations may be performed by morphing through an animated sequence of stacked graphs. Even if the combination of Rao and Yonts may suggest some form of morphing, it is submitted that claims 21, 22, and 31 would still be patentable for the reasons set forth for the patentability of the independent claims.

The rejection of claims 1-2, 8-9, and corresponding new computer program claims 24-25 under 35 U.S.C. 103(a) over the combination of Excel (Jinjer Simon 'Excel in a Nutshell' O'Reilly, 2001) in view of Dodge (Running Microsoft Excel 2000), further in view of Hao is respectfully traversed.

As set forth above, even given its best interpretation, Excel (Simon) does not disclose: enabling the user to interactively select one of these areas, and to perform one of the following operations:

- hiding the selected area,
- displaying the selected area

- reordering the position of the selected area within said ordered set responsive to said user selection.

For a teaching of these deficiencies in the basic Excel, Examiner looks to the Dodge and Hao references. Dodge does disclose that Excel (Simon) enables user to remove elements from a bar graph comparing the elements side by side. Applicant is not certain why Hao sections 0014-0016 is cited at this point since Dodge does enable the user to remove elements forming a bar graph. Applicants submit that the manipulation of side by side bar graphs is much different from the manipulation of stacked areas of time dependent variables in graphs with ordered sets of areas under a line representing the total value of the time dependent variables.

However, as Examiner admits (on page 17 of the Office Action) the combination of Excel (Simon) and Dodge still fail to disclose interactive manipulation by the user. Examiner looks to Hao for such a teaching. However, as has been set forth herein above, the teaching of Hao with respect to the present invention is very limited. At best Hao describes various data elements respectively shown or visualized as defined area segments in a user interactive graph. The user may select a sub-area on the graph which in effect will "rubber band" the selected area from its position on the graph. In response to this pulling out, the process of Hao displays aggregated information from the data visualized by the sub-area, e.g., number of data records or the average response time for a sales transaction. Apparently, upon completion of the use of the displayed aggregated information, the selected section must snap back into its position on the graph. This contribution of Hao with respect to the present invention appears to be remote.

Question as to the Date of the Dodge Publication

In his citation of the Dodge (Running Microsoft Excel 2000), Examiner indicates that the last page has a copyright notice presumably prior to the filing date of the present Application. Applicant's copy provided by the Patent Office does not have a page with such a copyright notice. Examiner is respectfully requested to clarify this point

The Rejection of dependent claims 3-6, 10-13 and new claims 26-29 over Excel (Simon), in view of Dodge and Hao in view of Havre under 35 U.S.C. 103(a) is respectfully traversed.

In this connection, irrespective of what Havre may disclose with respect to the hiding a selected area in a stacked graph, these dependent claims are submitted to be patentable over the combination of these references for the reasons set forth hereinabove for the patentability of independent claims 1, 8 and 24.


The Rejection of claims 21, 22, and 31 over the combination of Excel (Simon), in view of Dodge, and Hao et al. still further in view of Yonts under 35 U.S.C. 103(a) is respectfully traversed.

Claims 21, 22, and 31 are submitted to be patentable over the combination of Excel in view of Dodge further in view of Hao for all of the reasons set forth hereinabove for the patentability of claims 1, 8 and 24 from which these claims respectfully depend. In addition, claims 21, 22, and 31 set forth that the selected operations may be performed by morphing through an animated sequence of stacked graphs. Even if Yonts may suggest some form of morphing, it is submitted that claims 21, 22, and 31 would still be patentable for the reasons set forth for the patentability of the independent claims.

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In view of the foregoing, claims 1-14, 21, 22, and 24-31 are submitted to be in condition for allowance, and such allowance is respectfully requested.

Respectfully submitted,

  
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